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(54) Title: METHODS OF DIAGNOSIS OF CANCER COMPOSITIONS AND METHODS OF SCREENING FOR MODULATORS OF CANCER

(57) Abstract: Described herein are genes whose expression are up-regulated or down-regulated in specific cancers. Related methods and compositions that can be used for diagnosis and treatment of those cancers are disclosed. Also described herein are methods that can be used to identify modulators of selected cancers.

GTGAIIAILL CIIILLILVL MFVVWMKRRD KERQAKQLLI DPEDDVRDNI LKYDEEGGGE 780
EDQDYDLSQL QQPDTVEPDA IKPVGIRRMD ERPIHAEPQY PVRSAAPHPG DIGDFINEGL 840
KAADNDPTAP PYDSLLVFDY EGSGSTAGSL SSLNSSSSGG EQDYDYLNDW GPRFKKLADM 900
YGGGDD 906

Seq ID NO: 301 Protein Sequence
Protein Accession #: NP_058637.1

1 11 21 31 41 51

MVSPRMSGLL SQTVILALIF LPQTRPAGVF ELQIHSFGPG PGPGAPRSPC SARLPCRLFF 60
RVCLKPGLSE EAAESPCALG AALSARGPVY TEQPGAPAPD LPLPDGLLQV PFRDAWPGTF 120
SFIIETWREE LGDQIGGPAW SLLARVAGRR RLAAGGPWAR DIQRAGAWEL RFSYRARCEP 180
PAVGTACTRL CRPRSAPSRC GPGLRPCAPL EDECEAPLVC RAGCSPEHGF CEQPGECRCL 240
EGWTGPLCTV PVSTSSCLSP RGPSSATTGC LVPGPGPCDG NPCANGGSCS ETPRSFECTC 300
PRGFYGLRCE VSGVTCADGP CFNGGLCVGG ADPDSAYICH CPPGFQGSNC EKRVDRCSLQ 360
PCRNGGLCLD LGHALRCRCR AGFAGPRCEH DLDDCAGRAC ANGGTCVEGG GAHRCSCALG 420
FGGRDCRERA DPCAARPCAH GGRCYAHFSG LVCACAPGYM GARCEFPVHP DGASALPAAP 480
PGLRPGDPQR YLLPPALGLL VAAGVAGAAL LLVHVRRRGH SQDAGSRLLA GTPEPSVHAL 540
PDALNNLRTQ EGSGDGPSSS VDWNRPEDVD PQGIYVISAP SIYAREVATP LFPPLHTGRA 600
GQRQHLLFPY PSSILSVK 618

Seq ID NO: 302 Protein Sequence
Protein Accession #: fgenes prediction

1 11 21 31 41 51

MCQAFLWVLG TLWLLKNARC *LQPYPPEHAQ SCLISEAKQG QAQLPLGWVK WPLHLRSSLS* *60*
KRLERKYPSL LNGEIEAQIC KTSSLELPSC DLVTADGSTE VTISENLPAV GFHICQQQDS 120
HVEGMVNISK ASSGQM 136

Seq ID NO: 303 Protein Sequence
Protein Accession #: NP_079088.1

1 11 21 31 41 51

MGCGGSRADA IEPRYYESWT RETESTWLTY TDSDAPPSAA APDSGPEAGG LHSGMLEDGL 60
PSNGVPRSTA PGGIPNPEKK TNCETQCPNP QSLSSGPLTQ KQNGLQTTEA KRDAKRMPAK 120
EVTINVTDSI QQMDRSRRIT KNCVN 145

Seq ID NO: 304 Protein Sequence
Protein Accession #: XP_040550.1

1 11 21 31 41 51

MGADGETVVL KNMLIGINLI LLGSMIKPSE CQLEVTTERV QRQSVEEEGG IANYNTSSKE 60
QPVVFNHVYN INVPLDNLCS SGLEASAEQE VSAEDETLAE YMGQTSDHES QVTFTHRINF 120
PKKACPCASS AQVLQELLSR IEMLEREVSV LRDQCNANCC QESAATGQLD YIPHCSGHGN 180
FSFESCGCIC NEGWFGKNCS EPYCPLGCSS RGVCVDGQCI CDSEYSGDDC SELRCPTDCS 240
SRGLCVDGEC VCEEPYTGED CRELRCPGDC SGKGRCANGT CLCEEGYVGE DCGQRQCLNA 300
CSGRGQCEEG LCVCEEGYQG PDCSAVAPPE DLRVAGISDR SIELEWDGPM AVTEYVISYQ 360
PTALGGLQLQ QRVPGDWSGV TITELEPGLT YNISVYAVIS NILSLPITAK VATHLSTPQG 420
LQFKTITETT VEVQWEPFSF SFDGWEISFI PKNNEGGVIA QVPSDVTSFN QTGLKPGEEY 480
IVNVVALKEQ ARSPPTSASV STVIDGPTQI LVRDVSDTVA FVEWIPPRAK VDFILLKYGL 540
VGGEGGRTTF RLQPPLSQYS VQALRPGSRY EVSVSAVRGT NESDSATTQF TTEIDAPKNL 600
RVGSRTATSL DLEWDNSEAE VQEYKVVYST LAGEQYHEVL VPRGIGPTTR ATLTDLVPGT 660
EYGVGISAVM NSQQSVPATM NARTELDSPR DLMVTASSET SISLIWTKAS GPIDHYRITF 720
TPSSGIASEV TVPKDRTSYT LTDLEPGAEY IISVTAERGR QQSLESTVDA FTGFRPISHL 780
HFSHVTSSSV NITWSDPSPP ADRLILNYSP RDEEEEMMEV SLDATKRHAV LMGLQPATEY 840
IVNLVAVHGT VTSEPIVGSI TTGIDPPKDI TISNVTKDSV MVSWSPPVAS FDYYRVSYRP 900
TQVGRLDSSV VPNTVTEFTI TRLNPATEYE ISLNSVRGRE ESERICTLVH TAMDNPVDLI 960
ATNITPTEAL LQWKAPVGEV ENYVIVLTHF AVAGETILVD GVSEEFRLVD LLPSTHYTAT 1020
MYATNGPLTS GTISTNFSTL LDPPANLTAS EVTRQSALIS WQPPRAEIEN YVLTYKSTDG 1080
SRKELIVDAE DTWIRLEGLL ENTDYTVLLQ AAQDTTWSSI TSTAFTTGGR VFPHPQDCAQ 1140
HLMNGDTLSG VYPIFLNGEL SQKLQVYCDM TTDGGGWIVF QRRQNGQTDF FRKWADYRVG 1200
FGNVEDEFWL GLDNIHRITS QGRYELRVDM RDGQEAAFAS YDRFSVEDSR NLYKLRIGSY 1260
NGTAGDSLSY HQGRPFSTED RDNDVAVTNC AMSYKGAWWY KNCHRTNLNG KYGESRHSQG *1320*
INWYHWKGHE FSIPFVEMKM RPYNHRLMAG RKRQSLQF 1358

Seq ID NO: 305 Protein Sequence
Protein Accession #: NP_005874.1

1 11 21 31 41 51

MASSVAPYEQ LVRQVEALKA ENSHLRQELR DNSSHLSKLE TETSGMKEVL KHLQGKLEQE 60
ARVLVSSGQT EVLEQLKALQ MDITSLYNLK FQPPTLGPEP AARTPEGSPV HGSGPSKDSF 120
GELSRATIRL LEELDRERCF LLNEIEKEEK EKLWYYSQLQ GLSKRLDELP HVETQFSMQM 180
DLIRQQLEFE AQHIRSLMEE RFGTSDEMVQ RAQIRASRLE QIDKELLEAQ DRVQQTEPQA 240
LLAVKSVPVD EDPETEVPTH PEDGTPQPGN SKVEVVFWLL SMLATRDQED TARTLLAMSS 300
SPESCVAMRR SGCLPLLLQI LHGTEAAAGG RAGAPGAPGA KDARMRANAA LHNIVFSQPD 360
QGLARKEMRV LHVLEQIRAY CETCWDWLQA RDGGPEGGGA GSAPIPIEPQ ICQATCAVMK 420
LSFDEEYRRA MNELGGLQAV AELLQVDYEM HKMTRDPLNL ALRRYAGMTL TNLTFGDVAN 480
KATLCARRGC MEAIVAQLAS DSEELHQVVS SILRNLSWRA DINSKKVLRE AGSVTALVQC 540
VLRATKESTL KSVLSALWNL SAHSTENKAA ICQVDGALGP LVSTLTYKCQ SNSLAIIESG 600
GGILRNVSSL VATREDYRQV LRDHNCLQTL LQHLTSHSLT IVSNACGTLW NLSARSARDQ 660
ELLWDLGAVG MLRNLVHSKH KMIAMGSAAA LRNLLAHRPA KHQAAATAVS PGSCVPSLYV 720
RKQRALEAEL DARHLAQALE HLEKQGPPAA EAATKKPLPP LRHLDGLAQD YASDSGCFDD 780
DDAPSSLAAA AATGEPASPA ALSLFLGSPF LQGQALARTP PTRRGGKEAE KDTSGEAAVA 840
AKAKAKLALA VARIDQLVED ISALHTSSDD SFSLSSGDPG QEAPREGRAQ SCSPCRGPEG 900